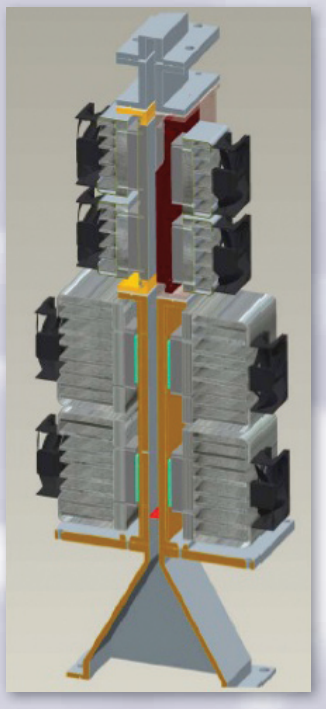
Measurement of Aerosol Size Distribution

Product

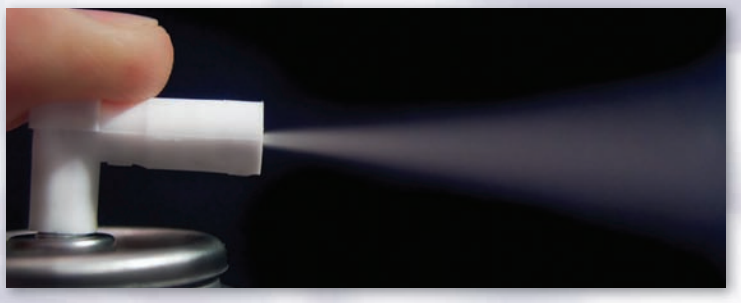
The basic technology is an aerosol mobility size spectrometer capable of measuring ambient particle size distribution. The technology can also be used to build an analytical instrument for applications in specific fields to measure aerosol size distribution with high time resolution (about 1 second) and size resolution (less than 100 nm in diameter) with a high signal-to-noise ratio.



Competitive Advantage

This spectrometer is an important addition to the currently available particle size analyzers due to its speed and ability to detect aerosol particles smaller than 100 nm in diameter – a size which is dominant in the atmosphere and prevalent in various applications. No prior knowledge about the refractive index of the aerosol particles is necessary to execute this technique.

Applications



The aerosol mobility size spectrometer is applicable in a broad range of fields including the environmental, atmospheric (climate), and inhalant (pharmaceutical and medical device) fields.

Reference: New fast integrated mobility spectrometer for real-time measurement of aerosol size distribution - Concept and theory, Pramod Kulkarni and Jian Wang, Journal of Aerosol Science, 37 (10), 1303-1325, 2006..

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License Status

Available for Licensing

- Non-Exclusive
- Exclusive

Patent Status

U.S. Patent

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